Immuno-Comprised Individuals

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, persons with HIV/AIDS or other immune system disorders, some elderly, and infants can be particularly at risk from infection.

These people should seek advice about drinking water from their health care providers. EPA/CDC guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline (1-800-426-4791).

Columbus' water is regularly tested for organisms that could be harmful to people - including Cryptosporidium (Crypto). While it is sometimes found in Ohio rivers and streams, Cryptosporidium has NEVER been found in our drinking water.

Total Organic Carbon

The value reported under "Level Found" for Total Organic Carbon (TOC) is the lowest running annual average ratio between the percentage of TOC actually removed to the percentage of TOC required to be removed. A value of greater than one indicates that the water system is in compliance with TOC removal requirements. A value of less than one indicates a violation of the TOC removal requirements. The value reported under "Range" for TOC is the lowest monthly ratio to the highest monthly ratio.

Source Water Assessment Information

A high-quality source water supply allows the Division of Water to provide consumers with quality water at a reasonable cost. Protecting our raw water sources requires investments to secure the needs of a growing population, now and in the future. As part of it's on-going efforts to maintain regulatory compliance and monitor our water supply, the Division of Water has completed a Source Water Assessment process. Below is a synopsis of the results:

The City of Columbus water system uses surface water from the Scioto River and Big Walnut Creek, as well as ground water pumped from sand and gravel deposits of the Scioto River Valley. All three sources of water have a relatively high susceptibility to contamination from spills or releases of chemicals. The ground water pumped at the Parsons Avenue planr is susceptible (compared to other ground water systems) because there is no significant clay overlying and protecting the aquifer deposits. The Scioto River and Big Walnut Creek are even more susceptible because they are more accessible and less protected from spills.

The drinking water source protection areas for the City of Columbus' three water sources contain numberous potential contaminant sources, especially the protection area for the Dublin Road Water Treatment Plant (extending along the Scioto River). These include industrial activities, storm water runoff from developing areas, and a heavily traveled transportation network running alongside and over the water bodies. Run-off from agricultural fields is a concern in both the Scioto River and Big Walnut Creek watersheds.

The City of Columbus treats the water to meet drinking quality standards, but no single treatment protocol can address all potential contaminants. The City has been proactive in pursuring measurables to further protect its source waters. These include land stewardship programs and incentive-driven programs to reduce erosion and run-off of pesticides and fertilizers into the Scioto River and Big Walnuts Creek and their reservoirs. More detailed information is provided in the City of Columbus' Drinking Water Source Assessment Report, which can be viewed by calling Gary Hannahs, Watershed Manager at (614) 645-1721.

How to read this report.

The goal of the Division of Water is to ensure that any contaminants in your drinking water are restricted below a level at which there is no known health risk. This report shows the types and amounts of key elements in your water supply, their likely sources and the maximum contaminant level (MCL) that the EPA considers safe.

Lead in the home.

Some older homes may have lead water pipes. Lead pipes are usually a soft dull, dark gray colored metal and can be easily gouged with a sharp object. Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that lead levels at your home may be higher than at other homes in the community as a result of materials used in your home's plumbing. If you are concerned about elevated lead levels in your home's water, you may wish to have your water tested. Additionally, flush your tap water for 30 seconds to two (2) minutes before using it. Additional information is available from the Safe Drinking Water Hotline (1-800-426-4791).

A brochure about lead in drinking water is available from the Columbus Division of Water. Call 614-645-6186 for your free copy.

Newborns and Nitrate.

Nitrate in drinking water at levels above 10 ppm is a health risk for infants less than six months of age. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. Local television, radio and print media will be notified within 24 hours if the level of nitrate rises above 10 ppm. The media will similarly be notified once the level decreases. If you are caring for an infant, you should ask advice from your health care provider.

None of the water supplied by the Columbus water plants exceeded the MCL in 2004.

What's not in your water.

Reports on TV and in the press often raise concerns about the health risks associated with the presence of certain minerals, chemicals or other contaminants in your food or water. The Columbus Division of Water performs thousands of tests each year to ensure drinking water quality. Many substances, for which the Division tests, never appear in this report because they are not found in the drinking water. For example, there are 51 volatile organic chemicals as well as arsenic, MTBE, radium 228, and ammonia (just to name a few) which are NOT found in your drinking water.

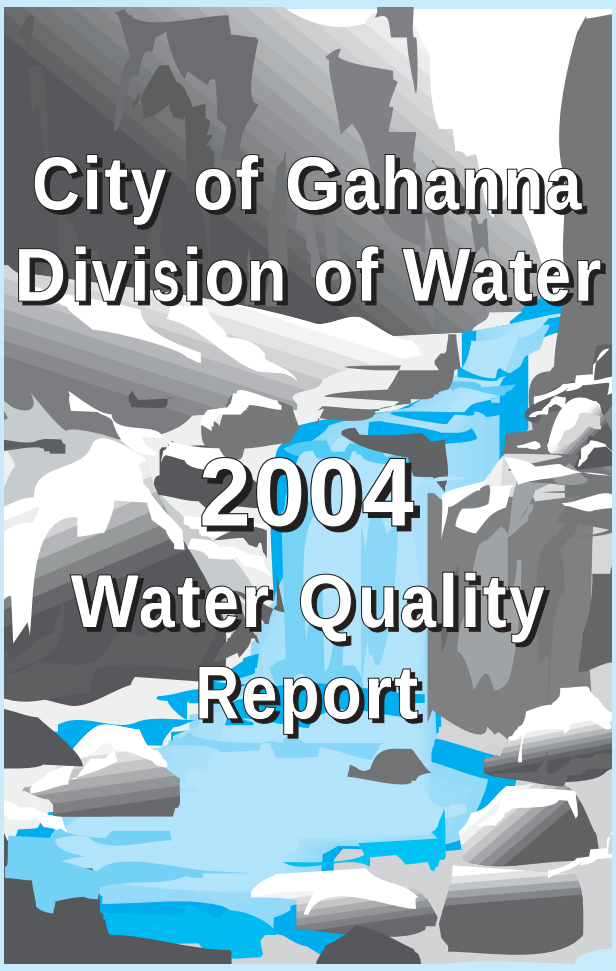
In order to ensure that tap water is safe to drink, USEPA prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. FDA regulations establish limits for contaminants in bottled water which must provide the same protection for public health.

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791).

POSTAGE REQUIRED

DIVISION OF WATER AND SEWER
200 SOUTH HAMILTON ROAD
GAHANNA, OHIO 43230-2996

QUALITY ON TAP



City of Gahanna Division of Water

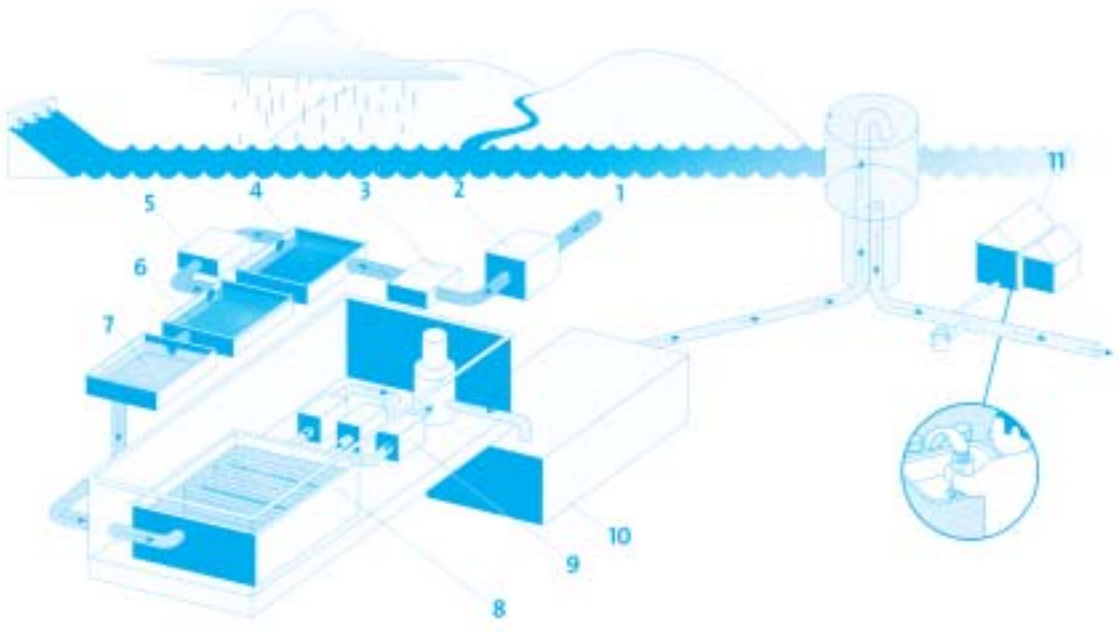
2004 Water Quality Report

BECKY STINCHCOMB
MAYOR

TERRY EMERY
SERVICE DIRECTOR

www.gahanna.gov

The Water Treatment Process



We treat water as a precious resource.

Water flows **(1)** to the treatment plant from the reservoir or stream through rotating screens **(2)** to remove large debris. It is then pumped into the plant where alum is added **(3)** to cause coagulation. After rapid mixing, the water remains in the settling basin **(4)** while sedimentation of floc occurs (2-4 hours).The water treatment residuals (settled floc) is pumped from the bottom of the pools and stored in holding lagoons to dry. The softening process **(5)** involves the addition of sodium carbonate (soda ash) or caustic soda and hydrated lime to remove calcium and magnesium ions that are responsible for water hardness.This process takes an additional 2-4 hours. For each pound of chemical used in the treatment process, two pounds are removed. After an additional sedimentation process, carbon dioxide is added **(6)** to lower the pH level to approximately 7.8. Water is held in a stabilizing basin **(7)** for another 2-4 hours. Water then flows through large dual-media rapid sand filters made up of layers of gravel, sand and anthracite coal **(8)**. Addition of chlorine to disinfect the water, fluoride to protect teeth and a corrosion inhibitor take place at the end of the process **(9)** before water enters large underground clearwells **(10)** to be held until needed by the community **(11)**. **Please note:** When ground water is used, neither screening **(2)** nor initial sedimentation **(3, 4)** is needed.

Distribution Map

The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs and wells. As water travels over the surface of the land or through the ground, it dissolves naturally-occurring minerals and, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity. Each home, school and business in the greater Columbus area receives water from one of three Division of Water plants.

Hap Cremeans Water Plant (HCWP) serves OSU and northern residents. The water source is the Hoover Reservoir.

Contact Us At: (614) 342-4005
Water Quality Assurance Laboratory

- Water Quality Monitoring Questions
- Regulatory Inquiries
- Taste/Odor/Colored Water Concerns

This report can also be found on our website at:
www.gahanna.gov
Just click on "Consumer Confidence"

A Reminder to Owners of In-ground Irrigation Systems

In most respects, the quality of your drinking water is determined by the source of the water and the treatment it receives. However, you unknowingly may also play a role in preserving the quality of our water. Especially if you have an in-ground irrigation sytem … your role may be more important than you think!

How can your irrigation system impact drinking water quality? The answer involves "backflow." Contamination by backflow can occur when conditions cause water to reverse its normal direction of flow, causing tainted water to draw back into the household plumbing or the public water distribution system.

So, how can you protect yourself and your neighbors from a potential backflow hazard from your irrigation system? Irrigation systems should always be equipped with backflow prevention devices. This is required under state health codes.

If you don't know if your system has an approved backflow device, ask the company who installed or maintains your system. Plumbers who are certified by the state of Ohio are familiar with backflow requirments.

State and City codes require that backflow devices be tested every year. An annual inspection must be completed by a plumber who is certified by the State of Ohio to test backflow devices.

If you have an irrigation system, and haven't included testing and upkeep of your backflow device as part of your yard maintenance tasks, we encourage you to do so. Remember, the people most likely to be endangered by a backflow situation at your house are those closest to it, which includes your family and neighbors.

Working together, we can prevent this type of contamination from occurring.

Water Quality Assurance

The WQAL performs water quality monitoring and treatment research to ensure that Columbus drinking water meets and exceeds all federally mandated Safe Drinking Water Act (SDWA) standards. The WQAL also provides water quality information to the water treatment plants and addresses customer complaints and inquiries regarding water quality.

To maintain compliance with current SDWA regulations, WQAL activities were directed at developing information regarding new and upcoming rules. These include the Unregulated Contaminant Monitoring Rule (UCMR), Stages 1 and 2 of the Disinfectant/ Disinfection Byproducts Rule (D/DBP), and the Long Term 2 Enhanced Surface Water Treatment Rule (LT2ESWTR) in 2003. Additionally, the lab has been closely involved in planning the improvement of watershed and water distribution system surveillance and detection measures for security concerns in the wake of 9/11 attacks and their associated heightened security protocols.

Along with the WQAL, the State of Ohio licenses and certifies that water plant operators charged with running and maintaining each of the water treatment plants. The operators also perform the critical task of treatment and process monitoring to insure the highest level of water quality leaving the plant.

Providing WATER, a life-sustaining resource, for the well-being and economic vitality of the community. ***This is our mission.***

PRIMARY DRINKING WATER STANDARDS

Substances we detected	When we checked	What's allowed? (MCL)	What's the goal? (MCLG)	HAP Cremean Water Plant Level found	Range of detection	Are we within Compliance?	Where did it come from?
Fluoride (ppm)	2004	4	4	1.17	0.56-1.17	Yes!	Water additive - protects teeth
Nitrate (ppm)	2004	10	10	1.5	0.7-1.5	Yes!	Agricultural fertilizer runoff
Simazine (ppb)	2004	4	4	0.19	<0.10-0.33	Yes!	Agricultural herbicide runoff
Atrazine (ppb)	2004	3	3	0.23	0.12-0.52	Yes!	Agricultural herbicide runoff
Alachlor (ppb)	2004	2	0	ND	ND	Yes!	Agricultural herbicide runoff
Metolachlor (ppb)	2004	No set level	No goal set	<0.20	<0.20-0.38	Yes!	Agricultural herbicide runoff
Metribuzin (ppb)	2004	No set level	No goal set	ND	ND	Yes!	Agricultural herbicide runoff
Chloroform (ppb)	2004	No set level	0	24.5	N/A	Yes!	By-product of drinking water disinfectant
Bromodichloromethane (ppb)	2004	No set level	0	6.75	N/A	Yes!	By-product of drinking water disinfectant
Dibromochloromethane (ppb)	2004	No set level	60	0.99	N/A	Yes!	By-product of drinking water disinfectant
Bromoform (ppb)	2004	No set level	0	<0.50	N/A	Yes!	By-product of drinking water disinfectant
Total Trihalomethanes (ppb)	2004	80	No goal set	45.6	33.0-63.6	Yes!	By-product of drinking water disinfectant
Total Haloacetic Acids (ppb)	2004	60	No goal set	46.4	29.8-54.8	Yes!	By-product of drinking water disinfectant
Total Alpha (pCi/L)	2003	15	0	<3	N/A	Yes!	Erosion of natural deposits
Total Beta (pCi/L)	2003	50	0	4.6	N/A	Yes!	Decay of natural and man made deposits
Total Organic Carbon	2004	TT (removal ratio >1)	No goal set	2.08	1.61-2.58	Yes!	Naturally present in environment
Total Coliform Bacteria	2004	Present in <5% of monthly samples	0%	0%	0-0%	Yes!	Bacteria present in environment
Total Chlorine (ppm)	2004	4 (MRDL)	4 (MRDLG)	1.68	0.66-2.30	Yes1	Disinfectant
Turbidity (NTU)	2004	TT[5]	No goal set	0.20 100%[6]	0.03-0.20	Yes!	Soil Runoff

No lead or copper testing required for 2004. Scheduled for 2006 testing.

[5] The EPA has two requirements: 1) That the maximum level found must be less than 1, and 2) That the level must be under 0.3 NTUs 95% of the time. [6] Percent meeting the standard.

OTHER WATER QUALITY PARAMETERS OF INTEREST

pH (units)	2004	No set level	No goal set	7.8	7.7-7.8	Yes!	Treatment process
Hardness	2004	No set level	No goal set	98	85-109	Yes!	Naturally occuring
Sodium (ppm)	2004	No set level	No goal set	11.9	8.6-16.4	Yes!	Natural/Treatment process

DEFINITIONS AND TERMS

Action Level (AL):	The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.
Maximum Contaminant Level Goal (MCLG)	The level of a contaminant in drinking water, below which there is no known or expected health risk. MCLGs allow for a margin of safety.
Maximum Contaminant Level (MCL)	The highest level of contaminant that is allowed in drinking water. MCLs are set as close to the MCLG as feasible using the best available treatment technology.
N/A	Not Applicable
ND	No Detect
NTU	Nephelometric Turbidity Unit (a measurment of particles held in suspension in water.)
Parts per billion (ppb) or Micrograms per liter (ug/L)	Are units of measure for concentration of a contaminant. A part per billion corresponds to one second in about 31.7 years.
Parts per million (ppm) or Milligrams per liter (mg/L)	Are units of measure for concentration of a contaminant. A part per million corresponds to one second in about 11.5 days.
pCi/L	Picocuries per liter (a measure of radiation).
MRDL	Maximum Residual Disinfectant Level
MRDLG	Maximum Residual Disinfectant Level Goal
The ">" symbol	This symbol means "greater than".
The "<" symbol	This symbol means "less than". For example, a result of < 5 means that the lowest level that could be detected was 5 and the contaminant in that sample was not detected.
Treatment Technique (TT)	A required process intended to reduce the level of a contaminant in drinking water. For turbidity the level must be under 0.3 NTU 95% of the time.